| | Application No. | Applicant(s) |
|---|--|-----------------|
| Notice of Allowability | 10/750,876 | IWAGUCHI ET AL. |
| | Examiner | Art Unit |
| | Jared J. Fureman | 2876 |
| The MAILING DATE of this communication appears on the cover sheet with the correspondence address All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308. | | |
| 1. This communication is responsive to the 1/5/2004 filing. | | |
| 2. The allowed claim(s) is/are <u>1-13</u> . | | |
| 3. Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some* c) None of the: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)). * Certified copies not received: | | |
| Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application. THIS THREE-MONTH PERIOD IS NOT EXTENDABLE. | | |
| 4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient. | | |
| 5. CORRECTED DRAWINGS (as "replacement sheets") must be submitted. (a) including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached 1) hereto or 2) to Paper No./Mail Date (b) including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d). 6. DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL. | | |
| Attachment(s) 1. ☑ Notice of References Cited (PTO-892) 2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948) 3. ☑ Information Disclosure Statements (PTO-1449 or PTO/SB/0 Paper No./Mail Date 01/2004 4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material | 6. ☐ Interview Summary Paper No./Mail Dat 8), 7. ☐ Examiner's Amenda | e |
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DETAILED ACTION

Receipt is acknowledged of the IDS, on 1/5/2004, which has been entered in the file. Claims 1-13 are pending.

Allowable Subject Matter

- 1. Claims 1-13 have been allowed over the prior art of record.
- 2. The following is an examiner's statement of reasons for allowance: The prior art of record, taken alone or in combination, fails to teach or fairly suggest a bar-code reader comprising a frequency-mapping unit, a transition-route forming unit, an error judging unit and a basic-width determining unit that perform as recited in claim 1; and the corresponding method of reading a bar code comprising calculating candidate values for the basic width, selecting a candidate value for the basic width, judging an amount of error in each of the combination patterns and calculating the basic width by performing the steps as recited in claim 10; in combination with the other claimed limitations as recited in the claims.

Ziemacki et al teaches a bar-code reader and method of reading a bar code including determining the ratio of the width of bar-code elements as compared to a reference width by dividing the bar-code element by a range of possible ratios (see column 7, line 58 - column 8, line 2) to find the correct width. However, Ziemacki et al is concerned with finding the width of each of the bar-code elements as compared to a reference width (referred to as a basic width by the present invention). Thus, it appears as though the reference width is already known in Ziemacki et al. The present invention

is concerned with finding a basic width (referred to as reference width by Ziemacki et al) that produces the least amount of error when used to decode the entire bar-code.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Liu (US 6,012,640), Dobras (US 3,886,521), Kawabata (US 5,302,814), Klancnik et al (US 5,329,105), Ackley (US 5,514,858), Lei (US 5,767,497), Heske, III et al (US 5,767,498), Iwaguchi et al (US 5,965,864), Watanabe et al (US 6,299,064), Watanabe et al (US 6,357,660) and Kobayashi et al (JP 1-156886 A) all teach bar-code readers and methods of reading bar-codes including determining the width of reference bars and/or width of bar-code elements.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jared J. Fureman whose telephone number is (571) 272-2391. The examiner can normally be reached on 7:00 am - 4:30 PM M-T, and every other Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael G. Lee can be reached on (571) 272-2398. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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January Examiner Art Unit 2876

September 19, 2005